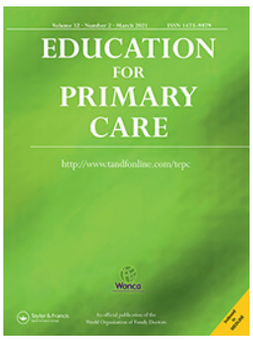

Taylor & Francis
Taylor & Francis Group

Education for Primary Care

ISSN: (Print) (Online) Journal homepage: https://www.tandfonline.com/loi/tepc20

'I'm just ringing to get a repeat prescription for my contraceptive pill, doctor': developing authentic simulated telephone consultations for medical students

Julie Beddows, Magdy Abdalla, David Blanchard, Ellie Hammond, Fiona Hay, Matthew Webb & Joanne Protheroe

To cite this article: Julie Beddows, Magdy Abdalla, David Blanchard, Ellie Hammond, Fiona Hay, Matthew Webb & Joanne Protheroe (2021): 'I'm just ringing to get a repeat prescription for my contraceptive pill, doctor': developing authentic simulated telephone consultations for medical students, Education for Primary Care, DOI: 10.1080/14739879.2021.1915708

To link to this article: https://doi.org/10.1080/14739879.2021.1915708

Published online: 23 Apr 2021.

EDUCATION FOR PRIMARY CARE
https://doi.org/10.1080/14739879.2021.1915708

Taylor & Francis
Taylor & Francis Group

TEACHING EXCHANGE

OPEN ACCESS Check for updates

'I'm just ringing to get a repeat prescription for my contraceptive pill, doctor': developing authentic simulated telephone consultations for medical students

Julie Beddows, Magdy Abdalla, David Blanchard, Ellie Hammond, Fiona Hay, Matthew Webb and Joanne Protheroe

School of Medicine, Keele University, Keele, UK

ABSTRACT

Within normal surgery hours telephone consultations have been previously shown to make up between 10–20% of patient contacts with General Practitioners (GPs) and to comprise a large proportion of a GP's daily workload. Although obviously very useful, such doctor–patient interactions can be fraught with risk. The General Medical Council (GMC) requires that newly graduated doctors should be adaptable to the challenge of delivering treatment advice and management remotely. Yet, currently, there is limited specific training in telephone consultation skills in both undergraduate and postgraduate curricula.

Authentic and properly supervised exposure of medical students to GP telephone consultations can be difficult to achieve in clinical placements. Therefore, we have developed emergency telephone consultations within our primary care Safe and Effective Clinical Outcomes (SECO) clinics which are simulated GP surgeries organised for our final year students. We have expanded the range of patients presenting in these clinics by including trained, simulated patients requesting an urgent telephone consultation with a GP. In doing so we aim to enhance our student's skills and confidence in conducting telephone consultations.

This teaching exchange paper aims to describe the ideas behind the construction of simulated patient telephone scripts together with the difficulties and successes encountered in introducing telephone consultations into our GP SECO clinic. We hope these ideas and processes will stimulate and enable others to help students prepare for this challenging area of clinical medicine made increasingly significant by the Covid-19 pandemic.

ARTICLE HISTORY
Received 30 September 2020
Revised 2 February 2021
Accepted 8 April 2021

KEYWORDS
Communication skills; safe and effective clinical outcomes; simulated; telephone consultation; Covid–19

Introduction

General practice is vital to the functioning of the National Health Service (NHS) in the United Kingdom. It is usually the first point of contact (90% of all NHS patient contacts occur in primary care) and is the gatekeeper to further resources.

The increasing demand for primary care appointments has led to an evolution away from face-to-face appointments towards telephone consultations. This increasing reliance on telephone consultations to maintain patient access, together with growing public acceptability, has seen a significant increase in the number of telephone consultations over the last few years [1]. An NHS report into trends in consultation rate found telephone consultation rates trebled over the study period increasing from 3% of all consultations in 1995 to 12% in 2009 [2]. This upsurge is echoed by Hobbs et al. [3] who similarly found an increase (99.6%) in telephone consultations over 7 years (2007/8–2013/14). Despite this important role, many doctors have been reluctant to provide this form of service and research suggests this reflects a lack of confidence, perceived vulnerability and, underpinning these, a lack of appropriate training [4]. Currently, there is limited specific training in telephone consultation skills in both undergraduate and postgraduate curricula [5]. In postgraduate GP training the use of Audio Consultation Observation Tools (Audio-COTs) has been developed and applied, where GP trainers observe trainees undertaking telephone consultations. Audio COTs have been shown to allow GP trainers additional assessment opportunities to develop the clinical competence of trainees' telephone consultation skills [6]. In undergraduate training, the educational benefits of structured teaching on the ability of final year medical students to receive telephone handovers and prioritise job lists has been also demonstrated [7]. However, specific formal training in the development of telephone consultations skills, away from the pressure of direct observation and assessment might be a valuable addition.

In line with the GMC mandate [8] that newly graduated doctors should be able to adapt to managing

CONTACT Magdy Abdalla m.abdalla@keele.ac.uk School of Medicine, Keele University, Keele, UK

patients remotely, we developed the use of simulated telephone consultations which were first introduced into our primary care Safe and Effective Clinical Outcomes (SECO) clinics in 2019. This paper describes the development of these simulated telephone consultations, together with some of the difficulties and successes encountered in introducing telephone consultations into our GP SECO clinic.

The SECO clinic

The SECO clinic was originally developed by Williams et al. [9] at the University of Otago in New Zealand. Drawing on a 'learning by doing' approach [10], the SECO clinic is grounded in constructivism through experiential learning and reflection. Underpinned by experiential learning theory, it aims to provide a safe environment for students to learn via the transformation of experience into knowledge [11] via their use of clinical reasoning, judgement, decision-making skills and taking responsibility to manage an entire consultation. This is achieved by the use of an unobserved, simulated surgery where simulated patients present with authentic real-life situations. Students have access to electronic resources and can ask for advice from a member of the faculty, who plays the role of a fellow health professional, based on the student's verbal presentation and handover of the patient. Safe and effective outcomes are the primary concern and are compared with an evidence-based checklist of outcomes drawn from up-to-date literature. Reflection-on-action is encouraged through the use of a safe and authentic simulated environment and is stimulated through the provision of feedback from multiple sources [12]. Each simulated patient gives written feedback on consultation skills, faculty members from whom the student has sought advice provide written feedback on the student's presentation and handover skills, with also verbal feedback offered via discussion of best practice in a debriefing session.

Method

The School of Medicine at Keele University adopted the use of primary care SECO clinics in 2016 and to our knowledge is the only UK University to employ them in an authentic primary care setting. Every final year medical student has the opportunity to participate individually in a two-hour Keele primary care SECO clinic. Each clinic takes place in a functioning general practice surgery, with each student having their own consulting room complete with computer and standard consulting room equipment for the duration of the simulation. The students are expected to document their consultations onto dummy electronic health records prepared for the SECO clinic and added to the general practice computer system. In this way the students experience a uniquely authentic GP setting.

We developed and introduced two emergency telephone consultations into our already established SECO clinics prior to the Covid-19 pandemic. Each case involves a trained, simulated patient who requests an immediate telephone consultation with a GP. Although the students are unaware of the potential for a telephone consultation beforehand, a piece of paper complete with the patient's details, mobile phone number and brief information is handed to them during the SECO clinic to mimic real-life, urgent interruptions commonplace in general practice. Each simulated patient has a mobile phone and is situated in a different room to the students to maximise authenticity.

The telephone cases

The two telephone cases are based on challenging and realistic situations. The cases were developed by experienced GP members of the teaching faculty using knowledge of current clinical practice and drawing upon up-to-date clinical evidence (see Boxes 1 and 2). Students are assessed on consultation process, documentation and achievement of safe and effective outcomes. Detailed student feedback is given from the simulated patient and the teaching faculty. Students are asked for their feedback on all aspects of the SECO session.

Students attend a facilitated debriefing session where their experience of the consultations are discussed. This includes obtaining feedback on the authenticity, content and logistical organisation of the cases which is then used by the faculty to improve the learning experience accordingly. Students have often reported that they get little exposure to telephone consultations on their primary care placements. Particular attention was paid to student feedback on the inclusion of the new telephone cases. There has been common agreement from students on the authenticity of the cases and the relevance to their learning.

In addition, feedback is sought during each SECO clinic from the simulated patients and faculty, again with particular attention paid to the new telephone cases.

Positives themes

We documented frequently received positive feedback from students concerning the telephone cases. Students have consistently reported the value of this experience

BOX 1. Case A – self-harm in an adolescent

Brief case overview

- Call from a distraught parent who has just walked in on their 16-year-old daughter self-harming
- Background of family tragedy and ongoing concerns with the daughters' mental health

Expected outcomes

(1) Parent feels the doctor explores their concerns regarding their daughter
(2) Possible management options are outlined
(3) A clear explanation is given regarding the need for the doctor to assess the patient directly before agreeing to any management
(4) Addresses parental ideas regarding anti-depressants and clearly explains why this would not be the best course of action at this time
(5) Evidence of assessment of parent's own mental health
(6) Issues of consent, confidentiality and capacity are addressed
(7) Documentation is proficient

BOX 2. Case B – repeat prescription request for combined oral contraceptive pill

Brief case overview

- A young female patient calling for a repeat prescription of her combined oral contraceptive pill
- Is going on holiday tonight and is about to run out
- Patient has been experiencing recent onset migraine with aura

Expected outcomes

(1) Patient is able to give an honest account of her sexual history and plans for holiday without perception of being judged
(2) Diagnosis of migraine with aura is recognised
(3) Patient understands the increased risk of stroke in migraine with aura
(4) Combined contraceptive pill is stopped
(5) Other methods of contraception are discussed
(6) Recognises the progesterone-only pill (POP) is the only realistic contraceptive option at this time
(7) The POP is discussed and the patient counselled appropriately
(8) Barrier contraception to reduce sexually transmitted infection risk is discussed

in terms of identifying gaps in their learning and often that this is one of the few opportunities they have had to practice telephone consultations in primary care. Feedback from students, the simulated patients and the faculty have confirmed the realistic and challenging nature of the cases.

Lessons learned for teaching faculty

Practicalities

To maintain authenticity, the simulated patients are in a separate room from the students. This has raised cost issues such as the need for hiring extra rooms. In an attempt to reduce these costs, we have successfully trialled having two simulated patients using mobile phones at opposite ends of the same room. Future sessions may include simulated patients calling in from their own homes, which might reduce costs further and currently would have the added advantage of social distancing for Covid-19 purposes.

Mobile phones were purchased specifically for SECO use. The use of mobile phones does raise the risk of problems with phone signal quality which could in theory have a detrimental effect on student experience. However, this has not been the case so far.

Training of simulated patients

Changing the consultation style has meant extra time and effort has been put into training simulated patients in this consultation method. Some simulated patients have had previous experience of telephones in simulated consultations in Observed Structured Clinical Examinations (OSCEs) or postgraduate assessment, although this more commonly has taken place with the simulated patient in the same room as the student, whilst others have no experience.

Discussion and future directions

The versatility of telephone consultations usually improves patient experience but can sometimes be perceived as increasing risk. The inability to examine the patient and the lack of non-verbal cues can potentially lead to challenges in diagnoses and potential safety concerns. Appropriate training and skills are therefore

required to be able to manage patients effectively and safely over the phone. All of this is reflected in the GMC's *Outcomes for Graduates* [8] which sets the standards for undergraduate medical learning. The standards set by the GMC explicitly include points on maintaining health and safety, communicating effectively and the safe remote prescribing of medications via telecommunications. The increasingly widespread utilisation of telephone consultations and the overarching importance of safe outcomes and the GMC standards means it is perhaps imperative that medical students receive training in this challenging form of consultation.

Arguably this has become even more critical in the light of recent and rapid adoption of increased telephone consultations in the Covid-19 pandemic as surgeries attempt to minimise patient contact in order to prevent the spread of disease. 'In a recent speech on, The Future of Healthcare', current Health and Social Care Secretary The Rt Hon Matt Hancock MP stated that of all routine GP consultations in the four-week run up to 12 April 2020, 71% were delivered remotely with 25% being face-to-face. This is a huge contrast when compared to the same time frame in the previous year where these figures were reversed [13]. A 'digital first' primary care approach was already a United Kingdom (UK) government aim prior to the Covid-19 pandemic as outlined in the *NHS Long Term Plan* [14]. This rate of change in consultation methodology within the space of a single year during the pandemic highlights the accelerated impact Covid-19 has had on primary care delivery.

We believe that introducing telephone consultations into SECO clinics has added an important and authentic consultation style that is clearly matched to the GMC's *Outcomes for Graduates* [8]. Furthermore, as technology-enabled communications platforms become more commonplace it seems certain that healthcare systems will need to develop to match the changing needs and technology usage of patients, the NHS and wider public health matters. It is important, therefore, that undergraduate students have training in this increasingly important consultation method to ensure their practice is safe and effective.

SECO clinics enable students to develop their remote consultation skills in a safe and authentic environment. Our experience of using emergency telephone consultations within a simulated GP SECO clinic has been successful both in terms of logistical development and feedback. It appears practical that SECO clinics could be a pivotal tool in a faculty's toolbox in delivering this training particularly as the SECO platform could be modified to include other technology-enabled consultations in the future. In doing so we aim to enhance our student's skills and confidence in conducting telephone consultations.

Due to Covid-19 we have currently adapted the SECO clinics to run remotely using telephone consultations only. However, our aspiration is to return to a mix of face-to-face and telephone consultations as soon as possible, together with the development and addition of video consultations in the future.

To mimic such real-life remote interactions simulated patients can call in from home with students remaining in an authentic GP setting. Although requiring increased planning, logistical development and simulated patient training, such modification should deliver effective student training in technology-based consultations both at a time when a pandemic has made acquiring these skills increasingly important and in an environment that is relatively Covid-19 safe.

We have expanded the range of patients presenting in these clinics by including trained, simulated patients requesting an urgent telephone consultation with a GP. We hope these ideas and processes will stimulate and enable others to help students prepare for this challenging area of clinical medicine made increasingly significant by the Covid-19 pandemic.

Disclosure statement

No potential conflict of interest was reported by the author(s).

References

[1] Chapman JL, Zechel A, Carter YH, et al. Systematic review of recent innovations in service provision to improve access to primary care. Br J Gen Pract. 2004;54:374–381.

[2] Hippisley-Cox J, Vinogradova Y Trends in consultation rates in general practice 1995/1996 to 2008/2009. [cited 23 Jan 2021]. Available from: https://digital.nhs.uk/data-and-information/publications/statistical/trends-in-consultation-rates-in-general-practice/trends-in-consultation-rates-in-general-practice-1995-2009

[3] Hobbs FDR, Bankhead C, Mukhtar T, et al. Clinical workload in UK primary care: a retrospective analysis of 100 million consultations in England, 2007–14. Lancet. 2016;387(10035):2323–2330.

[4] Car J, Freeman GK, Partridge MR, et al. Improving quality and safety of telephone-based delivery of care: teaching telephone consultation skills. BMJ Qual Saf. 2004;13(1):2–3.

[5] Chaudhry U, Ibison J, Harris T, et al. Experiences of GP trainees in undertaking telephone consultations: a mixed-methods study. BJGP Open. 2020;4(1): bjgpopen20X101008.

[6] Sales B, Scallan S, Crane S, et al. The audio-COT (consultation observation tool): developing a new

assessment tool for GP training. Educ Primary Care. 2015;26(5):335–339.
[7] Seale J, Ragbourne SC, Bejarano NP, et al. Training final year medical students in telephone communication and prioritization skills: an evaluation in the simulated environment. Med Teach. 2019;41(9):1023–1028.
[8] General Medical Council. Outcomes for graduates. General Medical Council; 2018. [cited 2018]. Available from: https://www.gmc-uk.org/-/media/documents/dc11326-outcomes-for-graduates-2018_pdf-75040796.pdf
[9] Williamson M, Walker T, Egan T, et al. The safe and effective clinical outcomes (SECO) clinic: learning responsibility for patient care through simulation. Teach Learn Med. 2013;25(2):155–158.
[10] Lesgold AM. The nature and methods of learning by doing. Am Psychologist. 2001;56(11):964–973.
[11] Kolb DA Experiential learning: experience as the source of learning and development. 1984. [cited 23 Jan 2021]. Available from: https://www.researchgate.net/profile/David_Kolb/publication/235701029_Experiential_Learning_Experience_As_The_Source_Of_Learning_And_Development/links/00b7d52aa908562f9f000000/Experiential-Learning-Experience-As-The-Source-Of-Learning-And-Development.pdf?origin=publication_detail
[12] Schön DA, De Sanctis V. The reflective practitioner: how professionals think in action. J Continuing Higher Educ. 2011. [cited 23 Jan 2021]. Available from: https://www.tandfonline.com/doi/abs/10.1080/07377366.1986.10401080
[13] Hancock M The future of healthcare. Presented at The Royal College of Physicians; 2020 July 20. London. [cited 23 Jan 2021]. Available from: https://www.gov.uk/government/speeches/the-future-of-healthcare
[14] National Health Service. The NHS long term plan. 2019. [cited 23 Jan 2021]. Available from: https://www.longtermplan.nhs.uk/